North American Climate Services Partnership

2017 Accomplishment Report

The North American Climate Services Partnership (NACSP) is an innovative trilateral initiative of the United States, Canada, and Mexico. This partnership exists in response to an increasing demand for accessible and timely scientific data and information that allow organizations and communities to make informed decision and enhance system resilience.

The NACSP provides a platform to facilitate the exchange of information, technology and management practices, and to develop climate information and the delivery of integrated climate services for North America.

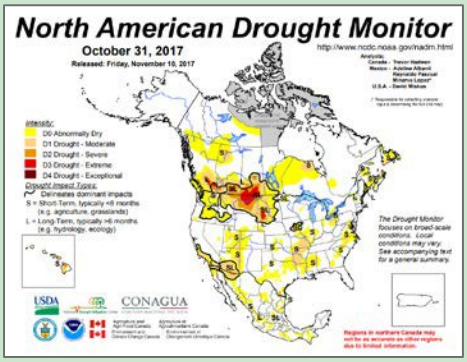
This Partnership builds on a strong foundation of existing continental-scale collaboration that includes the North American Ensemble Forecast Systems (NAEFS), the North American Multi-Model Ensemble (NMME), the North American Drought Monitor (NADM), and the North American Seasonal Fire Assessment and Outlook (NASFAO).

Fostered the development of key partnerships with users and stakeholders

Participated in national and regional forums that increased awareness of transboundary collaboration on drought and wildfires

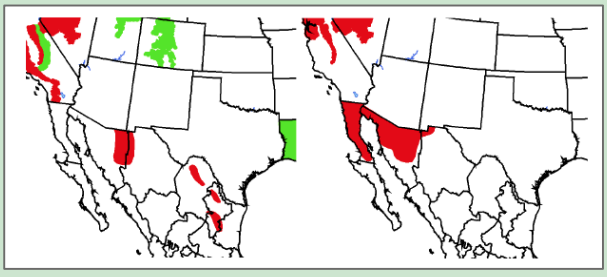
Compared methodologies to evaluate how stakeholders access and use climate information products in decisions, and assessed opportunities for best practices implementation across boundaries

Expanded partnerships with the National Integrated Heat Health Information System (NIHHIS) to improve transboundary responses to extreme event events



North American Drought Monitor from October 31, 2017

Empowered decision-making with state-of-the-art science



North American Seasonal Fire Assessment, June 2017 forecast of fire activity for July (left) and August (right) . Red and green shading indicates conditions favoring increased or decreased fire activity, respectively.

Enhanced the Rio Grande/Bravo Climate Impacts and Outlook reports with timely feature articles

Facilitated best practices information exchanges to enhance short- and long-term drought prediction and research activities

Implemented three transboundary drought analyses from regional focus areas (Columbia River, Great Lakes, and Rio Grande/Bravo River basins) into North American Drought Monitor monthly narrative discussions

Identified gaps in service delivery and end-user input

Assessed current trans-boundary products to improve the usefulness of information shared

Addressed stakeholder-defined service needs in the Rio Grande/ Bravo Climate Impacts and Outlook, by adding extended content and heat alert product

Initiated transmission of coordinated (US/CN/MX) NADM summaries on social media (Twitter, Facebook)

Regional heat-health curriculum training in El Paso County, TX, April 2018

Implemented a place-based approach

Significant events identified in the Quarterly Climate Impacts Outlook for the Gulf of Maine region for Sept – Nov 2017.

Produced and improved bilateral climate impact and outlook reports for the Rio Grande/Bravo, Great Lakes, Gulf of Maine, and Alaska/ Northwest Canada

Identified research gaps and vulnerability assessment approaches for the Great Lakes Basin

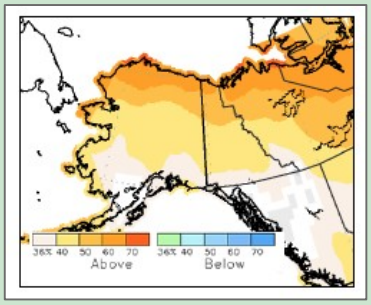
Shared best practices and lessons

Presented on transboundary collaboration in public meetings, journals and books

Enhanced data sharing has improved precipitation analysis skill over North America and a joint mapping tool is now available at cli-MATE

Accelerated the implementation of a North American Seasonal Forecast System

Exchanged insights, to improve forecast model development and product generation



A seasonal temperature forecast from the North American Multi-Model Ensemble (NMME) for Alaska/Northwest Canada

2018 Key goals

Enhance the **consistency of forecast information** across North America at different time scales

Organize and convene the 2018 **North American Drought Monitor Forum** in Canada

Develop **heat and human health assessments** in the Rio Grande/Bravo and Gulf of Maine transboundary pilots

Expand contributors and reach of **Climate Outlook and Impact reports**

Explore collaborative research on **drought in cold climates**

Share transboundary services experiences via **scientific presentations and publications**

Synthesize 2017 climate **trends and impacts in the Great Lakes Basin**

Expand transboundary engagement in regional **Drought Early Warning Systems** (DEWS)

Expand **data exchange and data resolution** to improve the North American Ensemble Forecast Systems

Explore expanding Canadian objective **fire forecast** approach to U.S. and Mexico

Expand the **learning networks for heat-health** along our borders

Renew **North American Multi-Model Ensemble** agreement

U.S.: U.S. National and Atmospheric Administration (NOAA), U.S. Department of Agriculture (USDA) , National Interagency Fire Center, RISA network, University of Arizona

Canada: Environmental and Climate Change Canada (ECCC), Natural Resources Canada (NRC), Agriculture and Agri-Food Canada

Mexico: Servicio Meteorológico Nacional (SMN), Comisión Nacional del Agua (Conagua), Instituto Mexicano de Tecnología del Agua (IMTA), Instituto Nacional de Ecología y Cambio Climático (INECC)

For more information:
http://cpo.noaa.gov/Partnerships/International